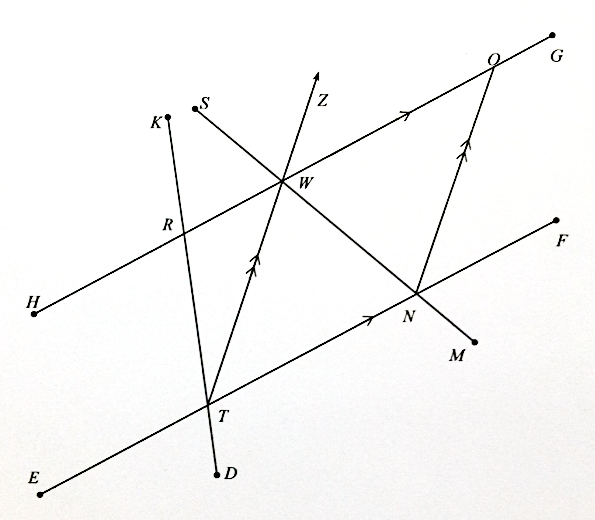
Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Date: \_\_\_\_\_\_\_\_\_\_\_\_\_\_ Per.: \_\_\_\_\_

**Angle Chase and Justification**

****Directions:

*There are 21 angles in the figure below. The diagram has not been drawn to scale, so you must rely on the angle relationships you have learned.*

1. Starting with the given diagram and the given information below, find the measures of all 21 angles.
2. List each angle in the order you find them.
3. Give a reason to justify each angle.

**Given:** is an angle bisector, , and

.

|  |  |  |  |
| --- | --- | --- | --- |
| **Statement** | **Reason** | **Statement** | **Reason** |
|  | Given | 12. |  |
|  | Given | 13. |  |
|  | Vertical angles are equal in measure. | 14. |  |
|  |  | 15. |  |
|  |  | 16. |  |
|  |  | 17. |  |
|  |  | 18. |  |
|  |  | 19. |  |
|  |  | 20. |  |
|  |  | 21. |  |
|  |  | 22. |  |